AMENDMENTS TO THE CLAIMS

The following listing of Claims will replace all prior versions and listing of claims in the application:

1. (currently amended) A method for printing comprising the steps of:

receiving a print designation to print a document;

receiving a description of graphics contained in the document;

obtaining one of the graphics;

determining if a preprocessed form of the graphic is available for reuse, and if so, retrieving the processed data therefor from preprocessed graphics storage, otherwise processing the graphic;

if the preprocessed form of the graphic is not available for reuse, then determining if the newly processed graphic should be stored in preprocessed graphics storage based on a criterion and if so, then storing the newly processed graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the graphic is repeated more than a predetermined number of times, whether the graphic is repeated across a plurality of documents to be printed, whether the graphic is less than an entire page, and whether a manual selection has been made; and

formulating a print job.

2-7. (cancelled)

8. (original) The method as defined in claim 1, further comprising the step of printing the document.

9. (currently amended) The method as defined in claim 2 1, wherein the processing step comprises creating a bitmap from the graphic.

10. (original) The method as defined in claim 1, wherein the obtaining step comprises interacting with a composition store service to obtain the graphic.

11. (original) The method as defined in claim 1, wherein the obtaining step comprises interacting with a graphic store service to obtain the graphic.

12. (original) The method as defined in claim 1, wherein the obtaining step comprises interacting with a web imaging extension to obtain the graphic.

13. (currently amended) A method for fast processing of graphics for printing, comprising the steps of:
        determining graphics that are to be preprocessed and reused based on a criterion selected from whether a given graphic is repeated more than a predetermined number of times, whether the given graphic is less than an entire page, whether the given graphic is repeated across a plurality of documents to be printed, and whether a manual selection has been made;
        preprocessing the determined graphics; and
        storing the preprocessed graphics;
        retrieving selected preprocessed graphics; and
        formulating a print job that includes the preprocessed graphics.

14-18. (cancelled)

19. The method as defined in claim 13, wherein the preprocessing step comprises creating a bitmap of the content.

20. The method as defined in claim 19, wherein the preprocessing comprises compressing the bitmap.

3

21. (currently amended) A printer web service for printing comprising:

a web interface;

a printer;

a first component for receiving a print designation from the web interface to print a document;

a second component for obtaining a description of graphics contained in the document;

a third component for obtaining one of the graphics or a reference thereto;

a fourth component for determining if the graphic has been already preprocessed and available for reuse, and if so, retrieving the processed data therefor from a preprocessed graphics storage, and if no, then processing the graphic; ~~and~~

a fifth component for formulating a print job; and

a sixth component for, if it is determined that a preprocessed form of the graphic is not available for reuse, determining if the newly processed graphic should be stored in preprocessed graphics storage based on a criterion and if so, then storing the newly processed graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the graphic is repeated more than a predetermined number of times, whether the graphic is repeated across a plurality of documents to be printed, whether the graphic is less than an entire page, and whether a manual selection has been made.

22. (cancelled)

23. (currently amended) A program product for printing comprising a computer readable medium having program code for causing a printer to perform the following method steps:

receiving a print designation to print a document;

receiving a description of graphics contained in the document;

obtaining one of the graphics or a reference thereto;

determining if a preprocessed form of the graphic is available for reuse, and if so, retrieving the processed data therefor from preprocessed graphics storage otherwise processing the graphic;

if the preprocessed form of the graphic is not available for reuse, then determining if the newly processed graphic should be stored in preprocessed graphics storage based on a criterion and if so, then storing the newly processed graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the graphic is repeated more than a predetermined number of times, whether the graphic is repeated across a plurality of documents to be printed, whether the graphic is less than an entire page, and whether a manual selection has been made; and

formulating a print job.

24-25. (cancelled)

26. (currently amended) A method for printing comprising the steps of:
receiving a print designation to print a plurality of documents;

receiving a description of graphics contained in the each of the plurality of documents;

for each of a plurality of the graphics in the plurality of documents,

obtaining the graphic;

determining if a preprocessed form of the obtained graphic has been is available for reuse, and if so, retrieving the processed data therefor from preprocessed graphics storage, otherwise processing the graphic; and

if the preprocessed form of the graphic is not available for reuse, then determining if the newly processed graphic should be stored in preprocessed graphics storage based on a criterion and if so, then storing the newly processed graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the graphic is repeated more than a predetermined number of times, whether the

graphic is repeated across the plurality of documents to be printed,
whether the graphic is less than an entire page, and whether a manual
selection has been made and
~~formulating a print job~~.

27-32. (cancelled)

33. (currently amended) The method as defined in claim 26, further
comprising the step of printing the plurality of documents.

34. (currently amended) The method as defined in claim ~~27~~ 26, wherein the
processing step comprises creating a bitmap from the graphic.

35. (original) The method as defined in claim 26, wherein the obtaining step
comprises interacting with a composition store service.

36. (original) The method as defined in claim 26, wherein the obtaining step
comprises interacting with a graphic store service.

37. (original) The method as defined in claim 26, wherein the obtaining step
comprises interacting with a web imaging extension.

38. (currently amended) A method for fast processing of graphics for printing
in a plurality of print jobs, comprising the steps of:
    determining graphics that are to be preprocessed in the plurality of print jobs
based on a criterion selected from whether a given graphic is repeated more than a
predetermined number of times, whether the given graphic is less than an entire

page, whether the given graphic is repeated across a plurality of documents to be printed, and whether a manual selection has been made;

    preprocessing the determined graphics;

    storing the preprocessed graphics;

    retrieving selected preprocessed graphics; and

    formulating a plurality of print jobs that includes the preprocessed graphics.

39-40 (cancelled)

41. (currently amended) A system for printing comprising:

    a component for receiving a print designation to print a plurality of documents;

    a component for receiving a description of graphics contained in the each of the plurality of documents;

    a component for obtaining the graphic for each of a plurality of the graphics in the plurality of documents;

    a component for determining if a preprocessed form of each of the obtained graphics has been is available for reuse, and if so, retrieving the processed data therefor from preprocessed graphics storage;

    a component for, if it is determined that a preprocessed form of a particular graphic is not available for reuse, determining if a processed form of the particular graphic should be stored in preprocessed graphics storage based on a criterion and if so, then processing and storing the particular graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the particular graphic is repeated more than a predetermined number of times, whether the particular graphic is repeated across a plurality of documents to be printed, whether the particular graphic is less than an entire page, and whether a manual selection has been made; and

    a component for formulating a print job.

7

42. (currently amended) A program product for printing comprising a computer readable medium having computer readable code for causing a system to perform the following method steps:

receiving a print designation to print a plurality of documents;

receiving a description of graphics contained in the each of the plurality of documents;

for each of a plurality of the graphics in the plurality of documents.

obtaining the graphic;

determining if a preprocessed form of the obtained graphic has been is available for reuse, and if so, retrieving the processed data therefor from preprocessed graphics storage; and

if the preprocessed form of the graphic is not available for reuse, then determining if the newly processed graphic should be stored in preprocessed graphics storage based on a criterion and if so, then storing the newly processed graphic in the preprocessed graphics storage, wherein the criterion is selected from whether the graphic is repeated more than a predetermined number of times, whether the graphic is repeated across the plurality of documents to be printed, whether the graphic is less than an entire page, and whether a manual selection has been made and

formulating a print job.

43 (new) A program product for fast processing of graphics for printing comprising a computer readable medium having computer readable code for causing a system to perform the following method steps:

determining graphics that are to be preprocessed and reused based on a criterion selected from whether a given graphic is repeated more than a predetermined number of times, whether the given graphic is less than an entire page, whether the given graphic is repeated across a plurality of documents to be printed and whether a manual selection has been made;

preprocessing the determined graphics; and

storing the preprocessed graphics.

8

S/N: 09/924,060
Case: 10008207-1
Response to Office Action

43. (new) The product as defined in claim 42, wherein the preprocessing step comprises creating a bitmap of the content.

44. (new) The product as defined in claim 43, wherein the preprocessing comprises compressing the bitmap.

9